

\* NOTICES \*

JPO and INPIT are not responsible for any damages caused by the use of this translation.

- 1.This document has been translated by computer. So the translation may not reflect the original precisely.
- 2.\*\*\*\* shows the word which can not be translated.
- 3.In the drawings, any words are not translated.

---

DETAILED DESCRIPTION

---

[Detailed explanation of the device]

[Field of the Invention]

[0001]

This device is related with neck WOMA or neck scrolling worn on a head. It is related with head volumes which promote circulation, such as neck WOMA for healthy, or neck scrolling, as well as winding around a head and wearing as an object for protection against the cold in detail, without having an adverse effect on skin.

[Background of the Invention]

[0002]

Between the young person, especially the woman, even when winter is cold, it is in fashion to be stylishly dressed in the sweater and coat of the V-neck which the breast opened greatly. Thus, the cold of the bosom must be put up with while pretending a difference of the breast of a coat greatly, in order to improve fashionability, without being late for fashion. Therefore, although a muffler may be worn, a crevice arises on a knot, a cold wind blows in into the crevice, and there are few effects of protection against the cold, and they are lacking in fashionability. Or \*\* and the difference part of the bosom which only wear neck WOMA of a tube-like object cannot be covered.

[0003]

On the other hand, the garments products which give priority to health over fashionability are known. That is, in order to use far-infrared rays, they are the knit fabric products which knit the thread which mixed thread, the Bincho charcoal, or tourmaline powder which coated ceramics. And as powder made to mix, these days, since a titanium raw material, titanium carbide powder, or a germanium raw material is circulation promotion and excitometabolism, it is observed. Each of these was wrapped in by textiles, and was directly contacted on the skin, it tries to cure the affected parts, such as muscular pain, and there was an appropriate effect.

[0004]

However, when the above-mentioned substance contacts directly the knit fabric which consists of thread coated or wrapped in on the skin, the skin which contacted may be influenced or eczema may come out. especially -- the user of an allergic constitution -- not only a contact portion but the whole body -- abnormalities, such as skin inflammations, -- \*\*\*\*\* -- there were also things.

[0005]

As mentioned above, the goods for increasing health attract attention reflecting the social trend of the latest health consciousness. Especially, there is an improvement with the garments put on every day, and although it is not related to neck WOMA of this design directly, the invention of the healthy textiles processed in the solution of the ultrafine particle of titanium is proposed. (Patent documents 1)

[0006]

[Patent documents 1] JP,2002-20969,A

[An indication of a device]

[Problem(s) to be Solved by the Device]

[0007]

However, there were the following problems in conventional neck WOMA.

[0008]

In coats, such as a sweater over which priority is given to fashionability, since it competes for a difference of a breast greatly, in conventional neck WOMA, the bosom cannot be covered but the bosom is cold.

[0009]

The shape of thread which, on the other hand, mixed filar, the Bincho charcoal, and tourmaline powder in which the problem of healthy \*\*\*\* as healthy garments products coated ceramics, Or it is difficult for the filar textiles containing titanium carbide powder to produce stably the textiles for which distribution of these powder particles is difficult, tends to start plugging of a filter or a nozzle, and contains powder, such as this, when manufacturing.

[0010]

Then, it is what was made in order that neck WOMA of this invention might solve such a conventional problem it has, By covering the bosom, and covering textiles, a titanium system raw material, or a germanium raw material by a knit fabric, and wrapping it by devising the design of conventional neck WOMA, It aims at providing neck WOMA which promotes the function of circulation promotion and excitometabolism as well as the effect of protection against the cold.

[Means for Solving the Problem]

[0011]

To achieve the above objects, a device of claim 1, So that it may be neck WOMA which consists of tube-like objects, the upper and lower sides of the trunk shaped part 1 may be equipped with the upper opening 4 and the lower opening part 5 and said lower opening part 5 may incline, The length of the neck front section 2 of said trunk shaped part 1 is constituted for a long time than the length of the neck back part 3, and a lower end part of said neck front section 2 is neck WOMA forming the tongue piece part 6.

[0012]

In addition to the above-mentioned feature of a device of claim 1, said neck back part 3 makes the fastener 8 intervene, and constituting the trunk shaped part 1, or making the trunk shaped part 1 divide and opening is also enabling a device of claim 2. This fastener 8 also makes it possible to open to a position which left a slight distance to a lower part from a lower end from an upper bed of the trunk shaped part 1. Contrary to this, this fastener 8 also makes it possible to open from a lower end of the trunk shaped part 1 to a position which left a slight distance upwards from an upper bed.

[0013]

A device of claim 3 makes the granule 11 which contains at least a kind of inorganic substance chosen from a titanium system raw material thru/or a germanium raw material form in said trunk shaped part 1 in addition to the above-mentioned feature of a device of claim 1.

[Effect of the Device]

[0014]

The first device can be made to fit calmly so that it may hang down to a thorax by making the part of the tongue piece part 6 loose, and there is the protection-against-the-cold effect. Since it sews by putting on the outline of the lower opening part 5, by the dignity of this heavy sewing part 7, from a head, it applies to the bosom and fits exactly. Since knitting fabric is made into rib stitch \*\*, a head is fitted, and moreover, the touch is good.

[0015]

Since the second device also makes it possible to make the fastener 8 intervene, to constitute the trunk shaped part 1, or to make the trunk shaped part 1 divide and to open, although a female hair style is held, it is preferred. [ of said neck back part 3 ] This fastener 8 also makes it possible to open to the position which left a slight distance to the lower part from the lower end from the upper bed of the trunk shaped part 1. Conversely, when this opens this fastener 8 wide from the lower end of the trunk shaped part 1 to the position which left a distance slight from an upper bed upwards and is fogged flatly, it does so the effect which make neck WOMA N easy to wear.

[0016]

The germanium mineral which contains the third invention in a granule has an operation of adjustment of an autonomic nerve, etc. The effect which the semiconductor similarly contained

combines with active oxygen in the living body, and carries out outside of the body is expected. Next, by the effect of a tourmaline mineral, a characteristic anion is made and the improvement-of-physical-condition effect is expected. It has effects, such as circulation promotion, excitometabolism, killing, and an endothermic, by the effect of a titanium raw material, and is effective in health promotion.

[The best gestalt for devising]

[0017]

The embodiment of this design is concretely described below based on the example of this design shown in the accompanying drawing.

[Example]

[0018]

The example of this design is described referring to drawing 1 - drawing 7. Drawing 1 is a perspective view of neck WOMA. Drawing 2 is a development view of the raw material of neck WOMA. Drawing 3 is a perspective view of neck WOMA of the second example. Drawing 4 is a perspective view of the middle knit fabric in the state where the granule was adhered, in neck WOMA of the third example. Drawing 5 is a perspective view showing the state of the same as the above and knit fabric products. Drawing 6 is a sectional view in the state where the granule was allocated in the same as the above and lining cloth. Drawing 7 is a perspective view showing the state where neck WOMA by this design was worn.

[0019]

As textiles used for neck WOMA of this design, polyester fiber, nylon 6 textiles, the Nylon 66 textiles, acrylic fibers, cotton, etc. can be raised. Neck WOMA fits a head when using it, and, preferably [ a thing with the sufficient touch ], and especially generally a horizontal network with large elasticity is used for it rib stitch \*\* which was excellent in elasticity by the knit fabric, and crosswise.

[0020]

It explains referring to drawing 1 and 2 for the first example. The opening of the upper and lower sides of the trunk shaped part 1 which constitutes neck WOMA N shown in drawing 1 is carried out, and they are provided with the upper opening 4 and the lower opening part 5. In a complete diagram, the graphic display direction is carried out a top and the bottom. The trunk shaped part 1 is a double knit fabric of the lining cloth 9 and the frontal land 10. The field of the lower opening part 5 inclines so that the length of the neck front section 2 of the trunk shaped part 1 may become longer than the length of the neck back part 3.

The tongue piece part 6 is formed in the lower end part of this neck front section 2.

The outline of the lower opening part 5 is formed from the heavy sewing part 7, and has prevented the fray of a knit fabric. Drawing 2 is in the state before finishing weaving neck WOMA N of drawing 1, and is shown as a development view of a raw material. The trunk-like

voxel material 101 judged from the knit fabric of one sheet is almost symmetrical, and spreads right and left from the center section 102. This periphery is provided with the upper limb 104, the side edge 103 on either side, and the margo inferior 105 that inclined toward the center of a lower part from these side edges 103, and that intersection constitutes the heights 106. The part of the neck front section 2 explained by drawing 1 is formed, and the heights 106 form the tongue piece part 6, and this center section 102 is a part which fits calmly so that it may hang down to a thorax, as shown in drawing 7 which this tongue piece part 6 mentions later. The trunk shaped part 1 is formed by inheriting, knitting and carrying out the side edge 103 on either side.

[0021]

It explains referring to drawing 3 for the second example. The point of difference with the first example is in the place between which the fastener 8 is made to be placed in three copies of the neck fronts, it also makes it possible to open from the lower end of the trunk shaped part 1 to the position which left a slight distance upwards from the upper bed, i.e., it is opened towards the upper opening 4 from the lower opening part 5. Said neck back part 3 other than a graphic display makes the fastener 8 intervene, and also makes it possible to constitute the trunk shaped part 1, or to make the trunk shaped part 1 divide and to open. This fastener 8 also makes it possible to open to the position which left a slight distance to the lower part from the lower end from the upper bed of the trunk shaped part 1. And the fastener 8 is sewn on the part of the side edge 103 of the right and left shown in drawing 2, and the trunk shaped part 1 is formed.

[0022]

It explains referring to drawing 4, and 5 and 6 for the third example. The point of difference between the first example and the second example is in the place which allocates the granule 11 in the inside of the double knit fabric of the trunk shaped part 1 suitably.

[0023]

The shape of the trunk shaped part 1 is the same as the first example and the second example. The state where the granule 11 was suitably allocated in the surface of the lining cloth 9 of the trunk shaped part 1 is shown in drawing 4. Like a graphic display, although the granule 11 is allocated in parallel up and down, even when it is alternate, even if slanting, it can arrange suitably. The frontal land 10 is covered in the state of drawing 4, the product of neck WOMA N is obtained, and it is shown in drawing 5.

[0024]

In this example, at least a kind of inorganic substance chosen from the titanium system raw material and the germanium system raw material as a raw material of the granule 11 is used. As an inorganic substance, a titanium system raw material, a germanium raw material, tourmaline, monazite, and bioceramics can be raised. It is the titanium compound and titanium

alloy which contain titanium metal or titanium as a titanium system raw material here. As a titanium compound, they are titanium oxide, titanium carbide, titanium nitride, etc. As a titanium alloy, the alloy of metal, such as copper, tin, iron, aluminum, chromium, cobalt, molybdenum, and tungsten, and titanium can be raised. And these titanium system raw materials are preferably used in the form of particles. It is because mixing with rubber etc. becomes easy. The granule 11 solidifies the inorganic substance described above using a polymer material as a binder.

[0025]

As a germanium raw material, it is a germanium mineral which contains germanium in the form of a compound. As a germanium compound, it is a germanium dioxide etc.

[0026]

A germanium raw material, a titanium raw material, and tourmaline can be used together. Tourmaline is called alias tourmaline and has aluminum, B, and Si as the main ingredients. a kind -- carrying out -- there are shawl tourmaline, lithia tourmaline, and DORABAITO tourmaline. Tourmaline is an ore of the hexagonal system of Mohs hardness 7-7.5 and specific gravity 3-3.3. Shall make a characteristic anion and the feature of tourmaline is effective to improvement of physical condition.

[0027]

Monazite can be used together with a germanium raw material and a titanium raw material in this example. Monazite is a kind of a thorium ore and is produced in granite pegmatite (megacryst). There is a transparent feeling as a crystal pillar-shaped or tabular [ brown ]. Including uranium, feldspar is made red with radiation and there is character which quartz is made to color black. Bioceramics, such as calcium phosphate, can also be used together in this example.

[0028]

As a high molecular compound as a binder used by this example, resin excellent in adhesive properties, such as an epoxy resin and butyral resin, and rubber can be used. However, the direction of the rubber which is easy to change has a small preferred possibility of stimulating skin. As rubber, silicone rubber, urethane rubber, isobutylene isoprene rubber, etc. can be used. These have the operation which solidifies the above-mentioned inorganic substance as a binder.

[0029]

The granule which consists of a polymer material containing at least a kind of inorganic substance chosen from the titanium system raw material thru/or the germanium raw material is created by the knit fabric side which does not touch skin. Since the granule 11 will tend to stimulate skin physically if formed in the side which touches skin, it forms so that the granule 11 may be sandwiched with the lining cloth 9 and the frontal land 10.

[0030]

The granule 11 which consists of a polymer material containing at least a kind of inorganic substance chosen from the titanium system raw material thru/or the germanium raw material is able to turn up a knit fabric to multiplex and to form the granule 11 in the stacked-up inner surface, in order to make it not stimulate skin.

[0031]

Below, it explains about the best gestalt of this example. First, the raw material of the following presentation is blended for granule formation. A "part" is a weight section here.

Unvulcanized silicon crude rubber 65.5 copies

Silicone rubber hardening agent 0.5 copy

Tourmaline 7 Part

Monazite 6 Part

Bioceramics 7 Part

Germanium 6 Part

Titanium 8 Part

Sum total 100 part

It mixes and the processing agent constituent A is created.

[0032]

Next, based on drawing 6, how to form the granule 11 in a knit fabric is explained. As shown in a figure, a constant interval is set on the surface of the lining cloth 9 of a knit fabric, and the above-mentioned processing agent constituent A is dropped at it, is vulcanized on it, and the granule 11 is formed (shown in drawing 4). Next, if it covers with the frontal land 10, neck WOMA N by this example will be obtained (shown in drawing 5). In this example, although the granule 11 was made to form in the surface of the lining cloth 9, it may be sufficient to make the granule 11 form in the back side surface of the frontal land 10.

[0033]

Other processing agent constituents are shown as follows.

Unvulcanized silicon crude rubber 73.5 copies

Silicone rubber hardening agent 0.5 copy

Tourmaline 7 Part

Monazite 6 Part

Bioceramics 7 Part

Germanium 6 Part

Sum total 100 part

It mixes and the processing agent constituent B is created.

[0034]

Other processing agent constituents are shown as follows.

Unvulcanized silicon crude rubber 72.5 copies

Silicone rubber hardening agent 0.5 copy

Monazite 6 Part

Bioceramics 7 Part

Germanium 6 Part

Titanium 8 Part

Sum total 100 part

It mixes and the processing agent constituent C is created.

[0035]

It is constituted as mentioned above and an operation and an effect are explained below.

[0036]

About the first example, by making the part of the tongue piece part 6 loose, a thorax can be made to fit calmly and there is the protection-against-the-cold effect. As shown in drawing 7, the state where neck WOMA N of this design was related is shown in a V-neck sweater, the bosom is hidden moderately, and the fashion effect is also aimed at with protection against the cold. Since it sews by putting on the outline of the lower opening part 5, by the dignity of this heavy sewing part 7, from a head, it applies to the bosom and fits exactly. Since knitting fabric is made into rib stitch \*\*, a head is fitted, and moreover, the touch is good.

[0037]

Since it also makes it possible to make the fastener 8 intervene, to constitute the trunk shaped part 1, or to make the trunk shaped part 1 divide and to open about the second example, it is desirable although a female hair style is held. This fastener 8 also makes it possible to open to the position which left a slight distance to the lower part from the lower end from the upper bed of the trunk shaped part 1. Conversely, when this opens this fastener 8 wide from the lower end of the trunk shaped part 1 to the position which left a distance slight from an upper bed upwards and is fogged flatly, it does so the effect which make neck WOMA N easy to wear.

[0038]

About the third example, it has an operation of adjustment of an autonomic nerve, etc. by the effect of a germanium mineral first. The effect which is combined with active oxygen in the living body from the characteristic of a semiconductor, and is carried out outside of the body is expected. Next, by the effect of a tourmaline mineral, a characteristic anion is made and the improvement-of-physical-condition effect is expected. It has effects, such as circulation promotion, excitometabolism, killing, and an endothermic, by the effect of a titanium raw material, and is useful to health promotion. A moderate stimulus is given by the granule containing a germanium raw material thru/or a titanium raw material, etc., and it is good for health.

[Industrial applicability]



[0039]

The purpose for spending of neck WOMA of this design may not be restricted to the use of \*\*\*\*, and may be used for the use of \*\*\*\*.

[Brief Description of the Drawings]

[0040]

[Drawing 1] It is a perspective view of neck WOMA of the first example of this design.

[Drawing 2] It is a development view of the raw material of the same as the above and neck WOMA.

[Drawing 3] It is a perspective view of the same as the above and neck WOMA of the second example.

[Drawing 4] In the same as the above and neck WOMA of the third example, it is a perspective view of the intermediate product in the state where the granule was allocated.

[Drawing 5] They are the same as the above and a perspective view showing the state of the product finished weaving.

[Drawing 6] It is a sectional view in the state where the granule was adhered to the same as the above and lining cloth.

[Drawing 7] It is a perspective view showing the state where neck WOMA by this design was worn.

[Description of Notations]

[0041]

N Neck WOMA

V V-neck

F Coat

1 Trunk shaped part

101 Trunk-like voxel material

102 Center section

103 Side edge part

104 Rising wood

105 Margo-inferior part

106 Heights

2 Neck front section

3 Neck back part

4 Upper opening

5 Lower opening part

6 Tongue piece part

7 Heavy sewing part

8 Fastener

9 Lining cloth

10 Frontal land

11 Granule

---

[Translation done.]

\* NOTICES \*

JPO and INPIT are not responsible for any damages caused by the use of this translation.

- 1.This document has been translated by computer. So the translation may not reflect the original precisely.
- 2.\*\*\*\* shows the word which can not be translated.
- 3.In the drawings, any words are not translated.

---

CLAIMS

---

[The scope of a claim for utility model registration]

[Claim 1]

It is neck WOMA which consists of tube-like objects,

The upper and lower sides of the trunk shaped part 1 are equipped with the upper opening 4 and the lower opening part 5,

The length of the neck front section 2 of said trunk shaped part 1 is constituted for a long time than the length of the neck back part 3 so that said lower opening part 5 may incline, Neck WOMA, wherein a lower end part of said neck front section 2 forms the tongue piece part 6.

[Claim 2]

Neck WOMA according to claim 1, wherein said neck back part 3 makes the fastener 8 intervene.

[Claim 3]

Neck WOMA according to claim 1 making the granule 11 which contains at least a kind of inorganic substance chosen from a titanium system raw material thru/or a germanium raw material form in said trunk shaped part 1.

---

[Translation done.]

**\* NOTICES \***

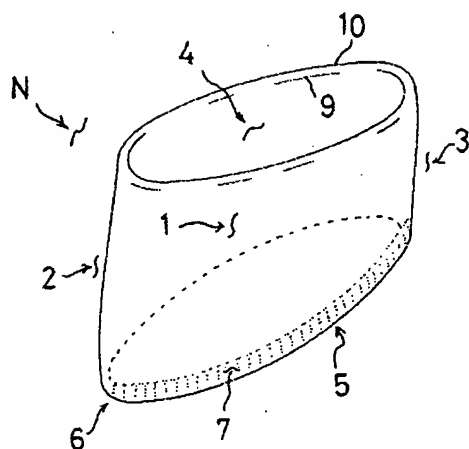
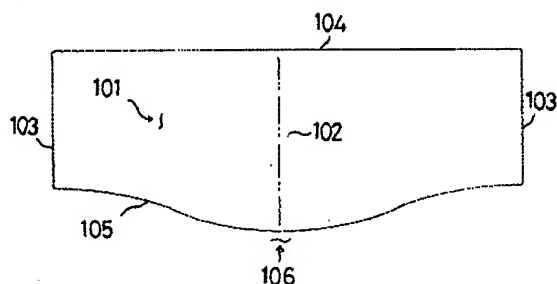
JP0 and INPIT are not responsible for any damages caused by the use of this translation.

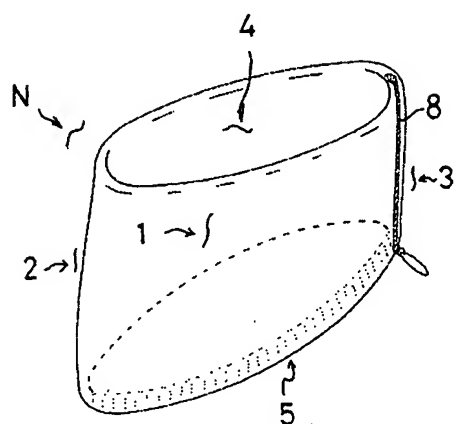
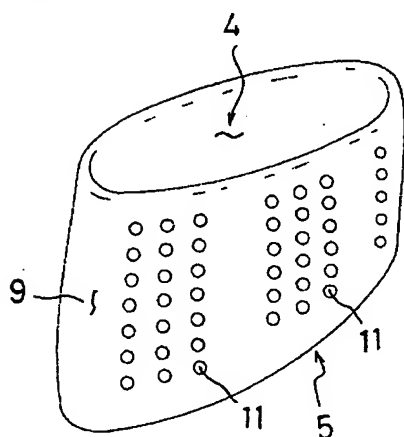
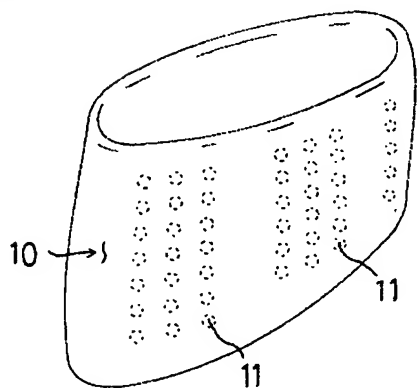
1. This document has been translated by computer. So the translation may not reflect the original precisely.
2. \*\*\*\* shows the word which can not be translated.
3. In the drawings, any words are not translated.

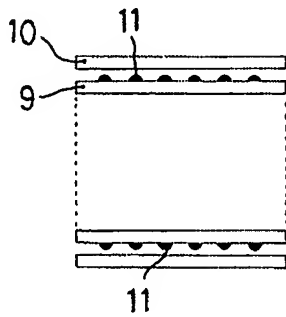
---

**DRAWINGS**

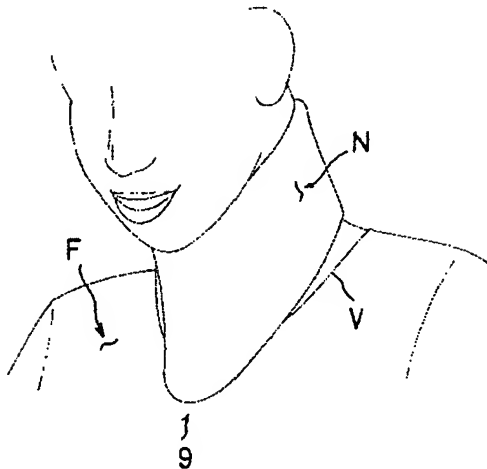
---

**[Drawing 1]****[Drawing 2]****[Drawing 3]**

**[Drawing 4]****[Drawing 5]****[Drawing 6]**



[Drawing 7]



---

[Translation done.]